

AMENDMENTS TO THE CLAIMS

The following listing of claims will replace all prior versions and listings of claims in the application.

LISTING OF CLAIMS

1. (currently amended) A method of transmitting data between a ground segment~~first location~~ and a plurality of airborne segments~~second location~~ comprising:
a forward link including:
____ obtaining a first data stream at said ground segment, the first data stream including a data header having routing information and a data payload having other information~~first location~~;
____ packet encrypting said first data stream to maintain said data header while encrypting said data payload;
____ sending said packet encrypted first data stream to said plurality of airborne segments~~second location~~; and
if said routing information in said data header matches an address of at least one of said plurality of airborne segments, decrypting said packet encrypted first data stream at least at said one of said plurality of said plurality of airborne segments; and
a return link including:
____ obtaining a second data stream at least at one of said plurality of airborne segments~~second location~~;
____ bulk encrypting said second data stream to encrypt all of said second data stream; and

_____ sending said bulk encrypted second data stream to said ground segment
first location; and

_____ decrypting said bulk encrypted second data stream at said ground segment.

2. (currently amended) The method of Claim 1 further comprising framing said first data stream after said step of packet encrypting said first data stream and prior to said step of sending said packet encrypted first data stream to said plurality of airborne segmentssecond location.

3. (currently amended) The method of Claim 1 further comprising spreading said first data stream after said step of packet encrypting said first data stream and prior to said step of sending said packet encrypted first data stream to said plurality of airborne segmentssecond location.

4. (original) The method of Claim 3 wherein said spreading step further comprises applying a forward error correction code to said first data stream.

5. (currently amended) The method of Claim 1 further comprising modulating said first data stream after said step of packet encrypting said first data stream and prior to said step of sending said packet encrypted first data stream to said plurality of airborne segmentssecond location.

6. (currently amended) The method of Claim 1 further comprising spreading said second data stream after said step of bulk encrypting said second data stream and prior to said step of sending said bulk encrypted second data stream to said ground segmentfirst location.

7. (original) The method of Claim 6 wherein said spreading step further comprises applying a forward error correction code to said second data stream.

8. (original) The method of Claim 6 wherein said spreading step further comprises applying a chipping code to said second data stream.

9. (currently amended) The method of Claim 1 further comprising modulating said second data stream after said step of bulk encrypting said second data stream and prior to said step of sending said bulk encrypted second data stream to said ground segmentfirst location.

10. (currently amended) The method of Claim 1 wherein said step of decrypting said packet encrypted first data stream at least at said one of said plurality of airborne segments further comprisescomprising packet decrypting said first data stream at said second location.

11. (currently amended) The method of Claim 10 further comprising de-modulating said first data stream prior to said step of decrypting said first data stream at said one of said plurality of airborne segments~~second location~~.

12. (currently amended) The method of Claim 10 further comprising de-spreading said first data stream prior to said step of decrypting said first data stream at said one of said plurality of airborne segments~~second location~~.

13. (original) The method of Claim 12 wherein said de-spreading step further comprises applying an inverse forward error correction code to said first data stream.

14. (currently amended) The method of Claim 10 further comprising de-framing said first data stream prior to said step of decrypting said first data stream at said one of said plurality of airborne segments~~second location~~.

15. (currently amended) The method of Claim 1 wherein said step of
decrypting said bulk encrypted second data stream at said ground segment further
comprises~~comprising~~ bulk decrypting said second data stream at said ~~first~~ location.

16. (currently amended) The method of Claim 15 further comprising de-modulating said second data stream prior to said step of decrypting said second data stream at said ground segment~~first~~ location.

17. (currently amended) The method of Claim 15 further comprising de-spreading said second data stream prior to said step of decrypting said second data stream at said ground segment~~first~~ location.

18. (original) The method of Claim 17 wherein said de-spreading step further comprises applying an inverse chipping code to said second data stream.

19. (original) The method of Claim 17 wherein said de-spreading step further comprises applying an inverse forward error correction code to said second data stream.

20. (currently amended) The method of Claim 1 further comprising packet compressing said first data stream prior to said step of sending said first data stream to said plurality of airborne segments~~second~~ location.

21. (currently amended) The method of Claim 201 further comprising bulk compressing said second data stream prior to said step of sending said second data stream to said ground segment~~first~~ location.

22 -27. (Cancelled)